Application No.: 10/516,864 Docket No.: 32144183-000004

Response to Office Action mailed October 15, 2007

Amendments to the Specification

Please amend the specification as follows:

Please amend  $\P$  [0013] as follows:

[0013] FIG. 2a and FIG. 2b illustrate detection of blood plasma β-catenin RNA from patients for

colorectal adenoma using RT-PCR.

Please amend ¶ [0014] as follows:

[0014] FIG. 2c illustrates detection of blood plasma β-actin RNA from patients for colorectal

adenoma using RT-PCR. FIG.2d and FIG.2e illustrate detection of plasma β-catenin and β-actin

RNA from healthy individuals using RT-PCR.

Please delete ¶ [0015]:

[0015] FIG. 3a, FIG. 3b, FIG. 3c, FIG. 3d, and FIG. 3e illustrate detection of serum \(\beta\)-catenin

DNA from patients with adenomas or carcinomas and normal controls.

Please amend ¶ [0031] as follows:

[0031] PCR analysis was first performed with serum DNA samples extracted from colorectal

carcinoma patients. The results showed that a 359 bp band was observed in all 15 serum DNA

samples (FIG. 3a, lanes 1 to 16). Ten patients were tested with confirmed adenoma ranging from

mild to severe dysplasia. [[P]] A positive band was detected in 9 of 1[[-]]0 patients (FIG. 3b,

lanes 1-11). The detection rate was 90%. The only negative case (FIG. 3b, lane 8) was

amplifiable as it yielded positive 156 bp band after amplification with <u>RET</u> specific primers

(FIG. 3d, lower panel, lane 13). PCR amplification of  $\beta$ -catenin was also performed on 10

healthy volunteer controls. None of the serum samples showed positive signals for  $\beta$ -catenin,

while positive signals were clearly detected using RET specific primers (FIG. 3c, lanes 1 to 10;

HOUDMS/222178.4 2

Application No.: 10/516,864 Docket No.: 32144183-000004

Response to Office Action mailed October 15, 2007

& 1D, lanes 1-11). In addition, a known positive carcinoma serum sample was carried out in parallel and showed typical 359 bp band on the agarose gel (FIG. 3c, lane 11 data not shown).).

Lane 12 of FIG. 3c & FIG. 3d are the negative control for PCR reaction. These results demonstrate the ability of β-catenin to accurately detect colorectal carcinoma and adenoma.

HOUDMS/222178.4 3